

Video Cassette Recorder **8**

# EV-C3

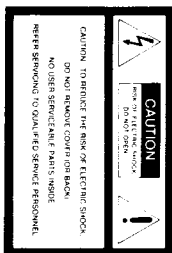
## Operating Instructions

Before operating the unit, please read this manual thoroughly and retain it for future reference.



## WARNING

To prevent fire or shock hazard, do not expose the unit to rain or moisture.



This symbol is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

This symbol is intended to alert the user to the presence of potentially dangerous voltages within the appliance.

**Owner's Record**  
The model number is located at the front and rear and the serial number on the front panel. Record the serial number in the space provided below. Refer to these numbers whenever you call upon your Sony dealer regarding this product.

Model No. EVCS      Serial No. \_\_\_\_\_

**Caution**  
Television programs, films, video tapes and other materials may be copyrighted material may be contrary to the provisions of the copyright laws. Also, use of this recorder with cable television transmission may require authorization from the cable television transmitter and/or program owner.

This unit uses 8mm video format cassettes. It is compatible with the standard (approximately 1.63 inches) and the LP model (approximately 0.72 inches).

### For the customers in the U.S.A.

This equipment generates and uses radio frequency energy and if not installed and used properly, that is, in strict accordance with the manufacturer's instructions, may cause interference to radio and television reception. This type of product is tested and found to comply with the limits for a Class B computing device in accordance with the specifications in Subpart J of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference in a residential installation. However, there is no guarantee that interference will not occur in a particular installation.

If you experience interference, you should consult the dealer or an experienced radio/television technician for additional suggestions. Such persons have been designated by the Federal Communications Commission to identify and solve "Radio Interference Problems". This booklet is available from the U.S. Government Printing Office, Washington, DC 20402, Stock No. 004-000-10365-4.

**CAUTION**  
TO PREVENT ELECTRIC SHOCK, DO NOT USE THIS POLARIZED AC PLUG WITH AN EXTENSION CORD, RECEPTACLE, OR OTHER OUTLET EXCEPT THE BLADES OF THE EXTENSION CORD ARE INSERTED TO PREVENT BLADE EXPOSURE.

**For the customers in Canada**  
This apparatus complies with the Class B limits for radio noise emissions set out in Radio Interference Regulations.

**Note to CATV system installer**  
This reminder is provided to call the CATV system installer's attention to Article 820.22 of the NEC that provides guidelines for proper grounding and, in particular, specifies that the equipment grounding conductor must be connected to the grounding system of the building as close to the point of cable entry as practical.

## Precautions

### On safety

- This unit operates only on 120 V A.C. 60 Hz.
- Should any safety device (such as fuses) in the cabinet be replaced, it must be replaced by one of the same type and rating as the original. It is recommended that a qualified person be consulted before operating it any further.
- One blade of the plug is wider than the other for the purpose of safety and it will fit into the power outlet only one way. If you are unable to insert the plug fully into the outlet, contact your dealer.
- Plugging the unit from the wall outlet if it is not going to be used for a long period of time may cause the power cord to pull it out by the plug. Never pull the cord itself.

### On installation

- Allow adequate air circulation to prevent internal heat buildup. Do not place the unit on surfaces (rugs, blankets, etc.) or near materials (curtains, draperies) that may block the ventilation slots.
- Do not install the unit near heat sources such as radiators or air ducts, or in a place subject to direct sunlight, excessive dust, mechanical vibration or shock.
- The unit is designed for operation in a horizontal position.
- Keep the unit and cassette tapes away from equipment with strong magnets, as for example microwave ovens or large loudspeakers.
- Do not place any heavy object on the unit.
- Do not install the unit near an AM receiver, since noise may be heard when listening to AM programs.

### On operation

- When the unit is not in use, turn the power off to conserve energy and to extend its life.
- Remove and store video cassettes after recording or playback.
- Store the cassettes in their cases and keep them in an upright position to prevent intrusion of dust and uneven winding.

### On cleaning

Clean the cabinet, panel and controls with a dry, soft cloth or a soft cloth lightly moistened with a mild detergent solution. Do not use any type of solvent, such as alcohol or benzene, which might damage the finish.

### On repacking

Do not throw away the carton and packing materials. They make an ideal container in which to transport the unit.

If you have any questions about this unit, contact your Sony service facility.

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## Introduction

### Overview of the EV/C3

The EV/C3 8 mm recorder enables easy editing of the tape. It has a built-in 8 mm camera recorder and other VCRs. Employing a CONTROL L connector and a CONTROL S IN jack, it is possible to perform synchronized editing, eliminating the need to operate two VCRs at a time during tape editing. Also, it is possible to remotely control the EV/C3 by a video editing controller such as the RMT-450. However, note that PCM recording/playback is available on some 8 mm recorders is not possible with this unit. The PCM sound recorded or after-recorded with another recorder cannot be played back with this unit. Its compactness and the ease of operation extends the enjoyment of creating your own video program.

### How the Manual is Organized

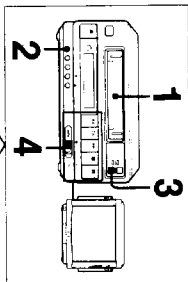
This manual is arranged to help you find the information you need for the operation of the EV/C3. The Table of Contents is at the beginning of this manual. In the Table of Contents, Read the "Antenna Connection" and "Setting the RF Unit" section first to make the correct connections to the TV unit before you begin.

### How the Manual Works

- Controls and setting on the EV/C3 are shown in capital letters.

#### Press the POWER button.

- The number in an illustration corresponds to the number in the text:



- Press the EDIT button and light the indicator.

- Notes are enclosed in a box like this:

#### Notes on the handling of batteries

- In normal operation the batteries will last for approximately 6 months.
- If the Commander will not be used for a long period of time, remove the batteries to avoid possible damage from battery leakage.

## Before You Begin...

Please go through this section before starting the operation of this unit.

### Supplied Accessories

Please check that the following accessories are supplied with your unit.

- Remote Commander RM-T 450



(1)

- Size AA (R6) Battery



(2)

- External antenna connector (200-ohm to 75-ohm matching transformer)



(1)

- 75-ohm coaxial cable with F-type connectors



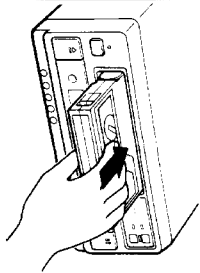
(1)

### Handling Video Cassettes

#### Cassette Insertion

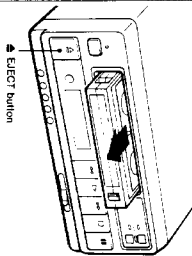
Insert the cassette fully into the unit with the window facing upwards. If the AC power cord is connected to the wall outlet, the power will be automatically turned on.

The cassette indicator and SP/LP mode indicator lights in the display window.



#### Cassette ejection

Press the **EJECT** button to unload the cassette. If the AC power cord is connected to the wall outlet, the cassette can be ejected even when the power of the unit is turned off.



EJECT button

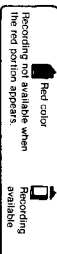
#### Recording/playback time

For recording, select the desired recording time by the SP/LP mode selection switch. For playback, the player automatically detects the recording format, SP or LP, of the cassette and then plays it back in the appropriate mode. The recording/playback time available in each mode.

Tape speed	Recording/Playback time	
Cassette used	SP mode	LP mode
PS-15MP	15 minutes	30 minutes
PS-30MP	30 minutes	1 hour
PS-60MP	1 hour	2 hours
PS-90MP	1 hour 30 minutes	3 hours
PS-120MP	2 hours	4 hours

#### To avoid erasing pre-recorded video contents

When a new recording is made on a previously recorded cassette, the previous recording will be automatically erased. To avoid unintentional erasure of pre-recorded video sources, slide the tab out to cover the opening. When the tab is showing, recording cannot be made. To re-record on a cassette, slide the tab in.



#### Notes on handling the cassette

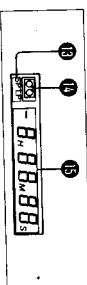
- Do not insert anything other than a cassette into the cassette compartment.
- Avoid using and storing the cassette in the location subject to dust, direct sunlight or near heat sources, susceptible to vibration, and subject to strong magnetic field.
- Store cassettes in their cases and keep them in a cool, dry place to prevent intrusion of dust and uneven winding.
- When the cassette will not be used for a long period of time, periodically rewind and advance the tape at a high speed, once or twice a year.
- Do not insert anything in the small holes on the rear of the cassette.

## Front

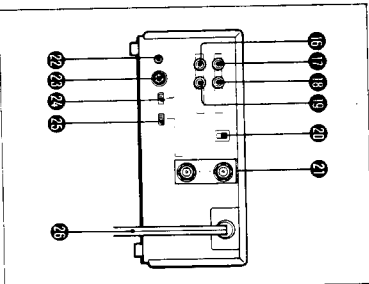
- **POWER ON/OFF switch and indicator**  
Press to turn on the power of the unit. The indicator lights when the power is supplied.
- **Remote sensor**  
Point the supplied Infrared Remote Commander RMT-450 here.
- **Cassette compartment**  
Insert a 8 mm format video cassette tape.
- **SYNCHRO EDIT button and indicator**  
Press to activate the SYNCHRO EDIT mode when controlling another VCR via the CONTROL L connector during editing.
- **EDIT button and indicator**  
Press to light the indicator and activate the EDIT mode when editing tapes. High quality picture can be obtained during editing by activating this mode. Normally keep the indicator turned on.
- **EJECT button**  
Press to unload the cassette.

- **SP/LP select button**  
Press to switch the recording mode.
- **COUNTER RESET button**  
Press to reset the tape counter to "00:00:00".
- **TAPE RETURN button**  
Press to advance or rewind the tape to the counter "00:00:00" point.
- **SLOW/STILL ADJUST V/A button**  
Press the "V" or "A" button to adjust the picture when slows speed or when picture enters vertically during slow motion playback or still mode.
- **REC sensor and indicator**  
Slide to the right to start recording.
- **Tape transport buttons and indicators**
  - ▶▶▶ REW (rewind)
  - ▶▶▶ F.F. (fast forward)
  - ▶▶▶ STOP
  - ▶▶▶ PAUSE/STILL

## Display window

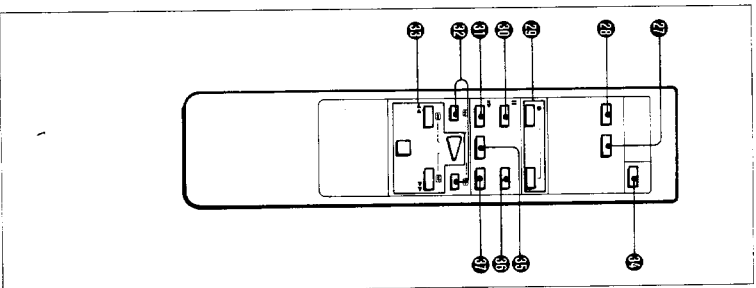


- **SP (standard play)/LP (long play) recording/playback mode indicator**
- **Cassette indicator**
- **Tape counter**



## Rear

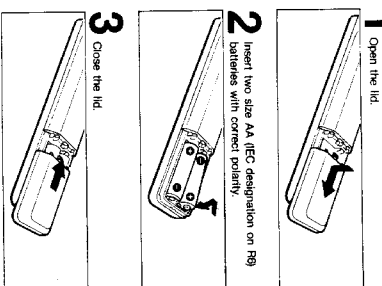
- **LINE OUT AUDIO jack (phono type)**
- **LINE IN AUDIO jack (phono type)**
- **LINE IN VIDEO jack (phono type)**
- **LINE OUT VIDEO jack (phono type)**
- **RF UNIT switch**  
Set to KCH or 4CH which is not assigned for a standard channel (referring to the "Setting the RF Unit" section).
- **VHF/UHF IN/OUT connector (F type)**  
Make connection referring to the "Antenna Connector" section.
- **CONTROL S IN jack (mini type)**  
Connect to the CONTROL S OUT jack of other Sony video products for remote control operation.
- **CONTROL L connector (6 pin DIN)**  
Connect to the CONTROL L connector of other Sony video products for remote control operation.
- **SLAVE/MASTER switch**  
Set to SLAVE when remotely controlling the unit by other Sony products via the CONTROL L connector. Set to MASTER when remotely controlling other Sony products via the CONTROL L connector by this unit.
- **TWTR switch**  
When connecting the unit and the TV via the VHF antenna terminal, normally TV programs to VTR. When you watch TV programs when the unit is in use, set this switch to TV.
- **AC power cord**



#### Remote Commander

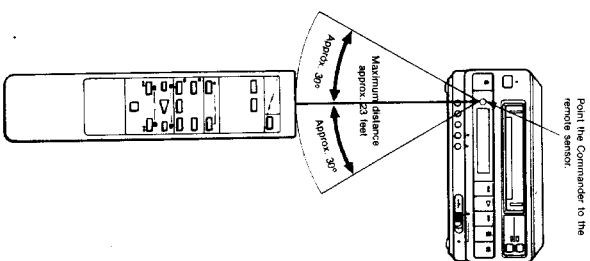
- **TAPE RETURN button**  
Functions the same as the TAPE RETURN on the unit.
- **COUNTER RESET button**  
Functions the same as the COUNTER RESET on the unit.
- **REC**  
Press the two buttons simultaneously to start recording.
- **II PAUSE**  
Functions the same as the PAUSE/STILL button on the unit.
- **III FRAME**  
Press during playback pause mode to view a frame-by-frame picture.
- **SEARCH**  
Press to obtain a locked picture search in which high-speed picture in forward or reverse can be viewed even when releasing the button.
- **Tape transport buttons (PLAY, REV, FF, STOP)**  
Functions the same as the buttons on the unit.
- **POWER ON/OFF switch**  
Press to turn the unit on and off.
- **x 1/10**  
Press during playback, playback pause, or x 2 playback mode to view playback at 1/10 times the normal speed (slow motion playback).
- **x 2**  
Press during playback or playback pause mode to view playback at two times the normal playback speed.
- **x 1/5**  
Press during playback, playback pause, or x 2 playback mode to view playback at 1/5 times the normal speed (slow motion playback).

#### How to Insert Batteries



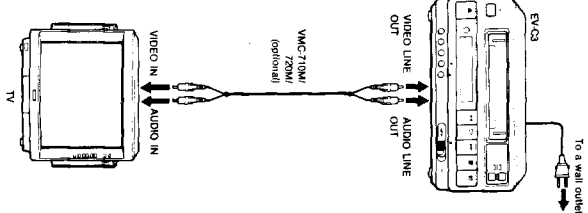
- Notes on the handling of batteries**
- In normal operation, the batteries will last for approximately 6 months.
  - If the Commander will not be used for a long period of time, remove the batteries to avoid possible damage from battery leakage.

#### The operating range of the Remote Commander



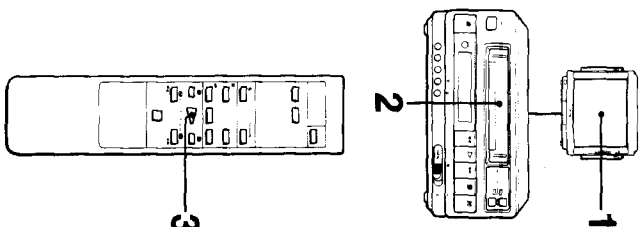
## Playing Back a Tape

**Connection (1) — To a TV with Video and Audio Inputs**



**Note**  
When the TV has both L/R audio inputs, use the optional VWC-770M/770M cable for connection.

## Operation



**1** Turn on the TV and set its input selector to "VTR".

**2** Insert the cassette fully into the cassette compartment.  
The power will automatically be turned on and the cassette indicator lights in the display window.

**3** Press the **▶ PLAY** button.  
The **▶** lamp lights, and the playback picture will appear on the TV screen.

To stop playback, press the **■ STOP** button.

To rewind the tape, press the **◀◀ REW** button.

To advance the tape in high speed, press the **▶▶ F.F** button.

To remove the cassette, press the **▲ EJECT** button.

### Auto rewind function

When the tape reaches its end after normal playback, it will automatically be rewound to the beginning and stops. However, the tape will not be rewound in the picture search or fast forward mode.

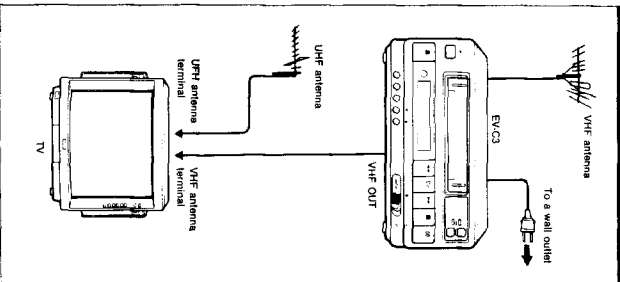
### Auto play function

The unit can be set to go into playback automatically when the tape is completely rewound to the beginning of the tape. Press the **▶ PLAY** button while holding down the **◀◀ REW** button. This function is operable only on the unit.

**Note**  
**When playing back a blank tape**  
A gray screen will appear on the TV screen.  
The tape counter will not function.

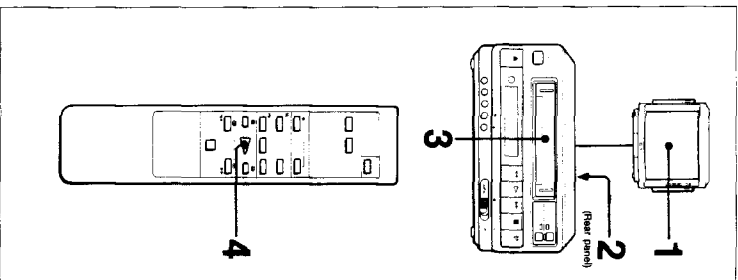
## Playing Back a Tape

**Connection (2) — To a TV without Video and Audio Inputs**



**Note**  
Various antenna connections can be considered depending upon the type of antenna and TV you have. See the Antenna Connection section first and make the correct connections.

## Operation



**1** Turn on the TV.

**2** Set the RF UNIT switch to either channel 3 or 4, whichever is not active in your area. Refer to the Setting the RF Unit section.

**3** Insert the cassette fully into the cassette compartment. The cassette will automatically be turned on and the cassette indicator lights in the display window.

**4** Press the > PLAY button. The > lamp lights, and the playback picture will appear on the TV screen.

**Note**  
**How to use the TV/VTR switch**  
When connecting the unit to a TV without video and audio inputs, set the VTR/TV switch as follows:

**VTR** — Normally set to this position. When the power to the unit is turned on, picture from the EV-C3 or the signal fed from the EV-C3's VIDEO LINE IN jack can be viewed on the screen. When the unit is turned off, TV programs can be viewed on the screen.  
**TV** — Set to this position when you wish to view TV programs when playing back the EV-C3 or recording video sources from the VIDEO LINE IN jack on the EV-C3.

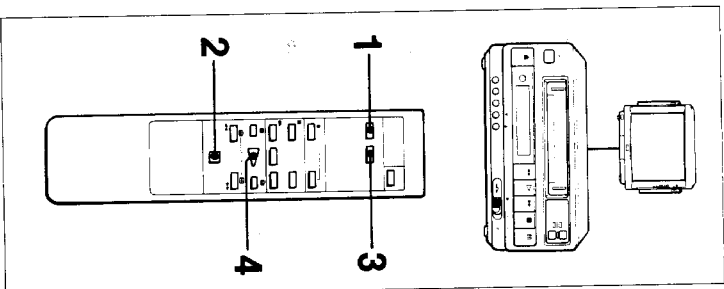


## Various Playback Modes

To obtain a still picture	During playback, press the <b>II PAUSE</b> button. The <b>II</b> lamp lights and a still picture can be seen. To resume normal playback, press the <b>▶ PLAY</b> button or the <b>II PAUSE</b> button again. When the picture has been shown for 7 minutes, the unit will enter the playback mode.
To search for a desired scene — Picture search	During playback or still mode, press the <b>◀ REW</b> button or the <b>▶ FF</b> button. While the button is pressed, a high speed picture without sound will appear on the TV screen. When the button is released, the unit will return to the previous mode.
To view the picture during fast forward or rewound mode — Locked picture search	During playback or still mode, press the <b>SEARCH</b> $\pm$ or the <b>SEARCH</b> $\pm$ on the Remote Commander. A high speed picture in forward or reverse will appear on the screen even when the button is released. To resume normal playback, press <b>▶ PLAY</b> .
To view a playback picture at 2 times the normal speed in the forward direction.	During playback or still mode, press the <b>x 2</b> button on the Remote Commander. The sound can be heard in this mode. To resume normal playback, press <b>▶ PLAY</b> .
To view a slow motion playback	During playback or still mode, press the <b>1/10</b> or the <b>1/5</b> button on the Remote Commander. The sound is muted in these modes. To resume normal playback, press <b>▶ PLAY</b> .
To advance the picture frame-by-frame	While in still mode, tap the <b>III FRAME</b> button. The picture advances frame-by-frame and the sound is muted. To resume normal playback, press <b>▶ PLAY</b> .
To view the picture momentarily while the unit is in still mode and without picture on the screen.	During fast forward mode, press <b>▶</b> . During rewound mode, press <b>◀</b> . A playback picture can be viewed while the button is pressed. Release the button to return to the previous mode.
Notes	Picture and sound during picture search modes A few streaks will appear on the screen but these are not a failure of the unit. Sound will be muted in the search modes. When playing back tapes recorded in SP mode A wide streak will appear on the screen during picture search mode compared to tapes recorded in LP mode. When viewing the picture in still or picture search mode, the picture streaks in the white and black portion may be reversed, depending upon the TV you are using.

## Use of the Tape Counter

To recall the scene selected during playback or recording



**1** During playback or recording, press the **COUNTER RESET** button at your desired scene. The tape counter will display "000000" (counter 0 point).

**2** Press the **STOP** button after playback or recording is completed.

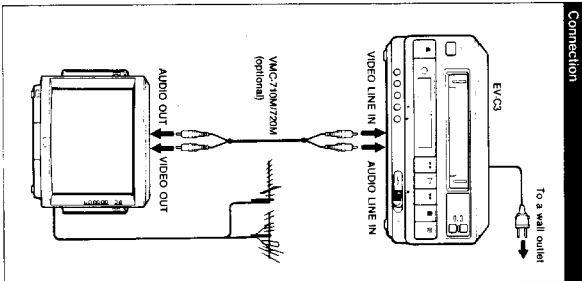
**3** Press the **TAPE RETURN** button. At this point, the tape counter must display more than 1 minute. Otherwise this function will not operate. The unit will start searching for the counter 0 point.

**4** Press the **▶ PLAY** button during the search mode. Playback starts from the scene selected in STEP 1.

If the **▶ PLAY** button is not pressed, the unit will stop at the counter 0 point.

**Note**  
Accuracy of the tape counter  
A tape counter equipped on the unit is not a clock counter; a certain amount of difference may occur between the time counter display and the actual recording/playback time. This difference may be noticeable in case when you have switched the recording mode.

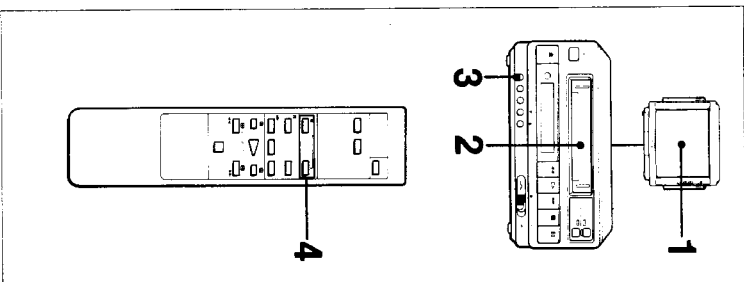
## Connection



## Notes

- As the EV-C3 has no built-in tuner, connect a TV with tuner as shown above to record TV programs. Connect the TV antenna directly to the EV-C3. Do not connect the LINE IN/VIDEO OUT or the EV-C3 to any TV set that has a built-in video/audio outputs. TV programs cannot be recorded unless you use a color TV tuner. Refer to the instruction of the tuner for connections.
- When the TV has both L/R outputs, connect to its left channel only.

## Operation



**1** Turn on the TV and select the program to be recorded.

**2** Insert a cassette fully into the compartment. The power will automatically be turned on and the cassette indicator lights in the display window.

**3** Select the recording mode by the **SP/LP** button.

**4** Press the two buttons simultaneously to start recording. The lamp on the REC button on the unit lights and recording starts.

To stop recording, press the **STOP** button.

To stop the tape for a moment, press the **PAUSE** button.

To resume recording, press the **PAUSE** button.

When recording pause mode lasts for more than approximately 7 minutes, the unit enters the stop mode.

## Auto rewind function

When the tape reaches its end during recording, it will automatically be rewound to the beginning and stops.

## Editing

You can create your own video program by editing with another VCR. Take a look at the list below to find the type of editing you can perform with your video system.

### To Make a Copy of the Tape

Playing back with another VCR and recording with the EV-C3 ..... Page 21  
Playing back with the EV-C3 and recording with another VCR ..... Page 22

### To Gather Desired Scenes from the Original Tape — Assemble Editing

If your VCR is equipped with a control terminal  
Playing back with another VCR and recording with the EV-C3 ..... Page 23  
Playing back with the EV-C3 and recording with another VCR ..... Page 26  
If your VCR is not equipped with a control terminal  
Playing back with another VCR and recording with the EV-C3 ..... Page 27  
Playing back with the EV-C3 and recording with another VCR ..... Page 28

### To Re-record New Scenes onto the Original Tape — Insert Editing

Playing back with another VCR and recording with the EV-C3 ..... Page 29

### Editing with a Video Remote Controller

Controlling the EV-C3 with the Sony RM-E100V video editing controller ..... Page 32

#### Notes for Editing

Use of the EDT button  
When the EDT mode is activated during editing, the quality of the edited tape will have a certain extent of degradation in picture and sound. Please avoid using the edited tape for multiple generations of editing.

#### Caution

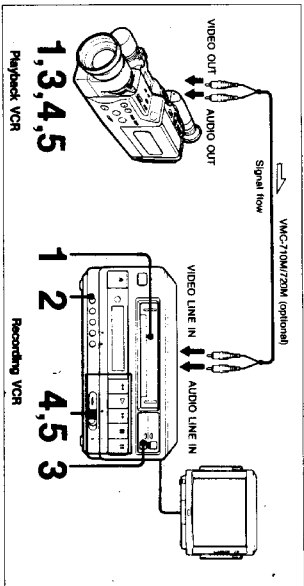
Telephone programs, films, video tapes and other materials may be copyrighted.  
Unauthorized duplication of such material may be contrary to the provisions of the copyright laws.

#### When assemble editing is activated by the

STANCHRO EDIT button  
The unit will automatically stop when the counter reaches "00:00:00."

### To Make a Copy of the Tape

■ Example 1: Playing back with another VCR and recording with the EV-C3



#### Playback VCR

#### Recording VCR

1 Turn on the power of the unit and insert a source tape. Insert a cassette for recording.

2 Select the recording mode by the SP/LP button.

3 Activate the EDT mode if the unit has this function. Press the EDT button and light the indicator.

4 Search for the playback start point and enter the playback pause mode. Search for the recording start point and enter the recording pause mode.

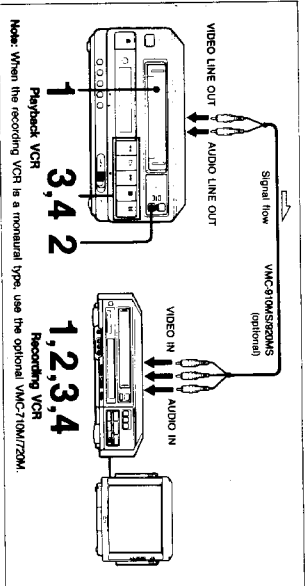
5 Press the PAUSE button both of the units simultaneously. Press the PAUSE button on the playback VCR a little before the recording VCR.

#### When copying is completed

Press the STOP button on both of the units.

## To Make a Copy of the Tape

- Example 2 — Playing back with the EV-C3 and recording with another VCR



## Playback VCR

- 1 Insert a source tape.

- 2 Press the EDIT button and light the indicator.

- 3 Search for the playback start point and enter the playback pause mode.

- 4 Press the PAUSE button on both of the units simultaneously.  
Press the PAUSE button on the playback VCR a little before the recording VCR.

When copying is completed  
Press the STOP button on both of the units.

## Recording VCR

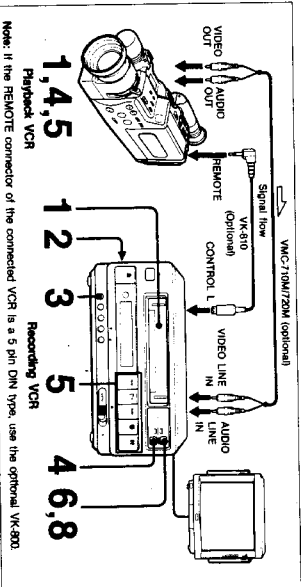
- 1 Turn on the power of the unit and insert a cassette for recording.

- 2 Activate the EDT mode if the unit has this function.

- 3 Search for the recording start point and enter the recording pause mode.

## To Capture Desired Scenes from the Original Tape — Assemble Editing

- Example 1 — Using the Control L connector  
Playing back with another VCR and recording with the EV-C3



## Playback VCR

- 1 Turn on the power of the unit and insert a source tape.

- 2 Set the SLAVEMASTER switch to MASTER.

- 3 Select the recording mode by the SP/LP button.

- 4 Press the EDT button if the unit has this function.

- 5 Search for the playback start point and enter the playback pause mode.  
Search for the start point of the edit and enter the recording pause mode.

## Editing

## Playback VCR

## Recording VCR

Press the **SYNCHRO EDIT** button.  
The indicator of the **SYNCHRO EDIT** and **EDIT** button lights.

## Playback starts.

## Recording starts.

7

The unit enters the playback pause mode.

Press the **SYNCHRO EDIT** button at the end point of the edit.  
The unit enters the recording pause mode.

## To edit the next scene

Repeat steps 5 to 7.

## To stop during assemble editing

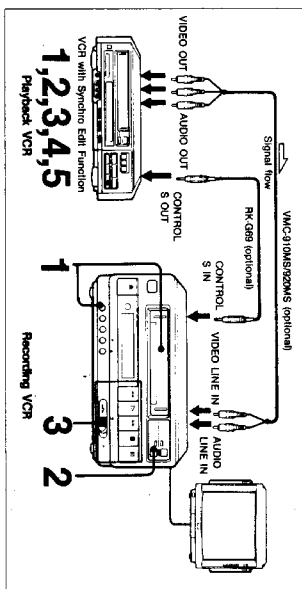
Press the **SYNCHRO EDIT** or **STOP** button.

## When editing is completed

Press the **STOP** button on both of the units.

## To Gather Desired Scenes from a Pre-recorded Tape: Assemble Editing

**Example 2** — Using the Control S IN Jack  
Playing back with another VCR and recording with the EV-C3



## Playback VCR

## Recording VCR

**1** Turn on the power of the unit and insert a source tape.

Insert a cassette.  
Select the recording mode by the **SP/LP** button.

**2** Press the **EDIT** button if the unit has this function.

Press the **EDIT** button.

**3** Search for the playback start point and enter the playback pause mode.

Search for the edit start point and enter the recording pause mode.

**4** Press the **SYNCHRO EDIT** button.

Press the **SYNCHRO EDIT** button.

**5** Press the **SYNCHRO EDIT** button at the end point of the edit.  
The unit enters the playback pause mode.

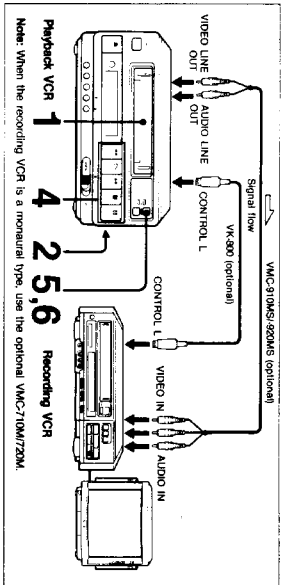
The unit enters the recording pause mode.

To edit the next scene  
Repeat steps 3 to 5.

To stop during assemble editing  
Press the **SYNCHRO EDIT** or **STOP** button.  
When editing is completed  
Press the **STOP** button on both of the units.

### To Gather Desired Scenes from a Pre-recorded Tape — Assemble Editing

**Example 3 —** Using the Control L connector  
Playing back with the EV/CS and recording with another VCR



#### Playback VCR

**1** Insert a source tape.

Recording VCR  
Turn on the power of the unit and insert a cassette.

**2** Set the SLAVEMASTER switch to MASTER.

Set the SLAVEMASTER switch to SLAVE.

**3**

Activate the EDIT mode if the unit has this function.

**4** Search for the playback start point and enter the playback pause mode.

Search for the edit start point and enter the recording pause mode.

**5** Press the SYNCHRO EDIT button.

The indicator of the SYNCHRO EDIT and EDIT button lights.

**Playback starts.**

**6** Press the SYNCHRO EDIT button at the end point of the edit.

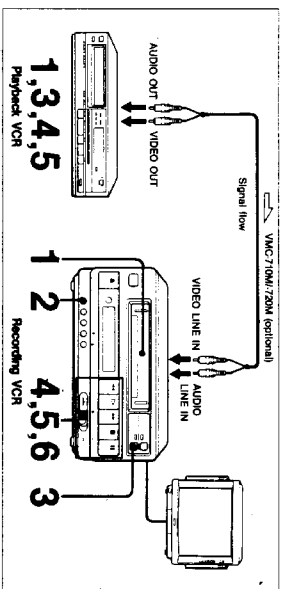
The unit enters the playback pause mode.

To edit the next scene  
Repeat steps 4 to 6.

To stop during assemble editing  
Press the SYNCHRO EDIT or ■ STOP button.  
When editing is completed  
Press the STOP button on both of the units.

### To Gather Desired Scenes from the Original Tape — Assemble Editing

**Example 4 —** Using a VCR not equipped with a control terminal  
Playing back with another VCR and recording with the EV/CS



#### Playback VCR

**1** Turn on the power of the unit and insert a source tape.

Recording VCR  
Insert a cassette.

**2**

Select the recording mode by the STILL button.

**3**

Activate the EDIT mode if the unit has this function.

**4** Search for the playback start point and enter the playback pause mode.

Search for the edit start point and enter the recording pause mode.

**5**

Release the playback and recording pause mode of both VCRs.  
Press the PAUSE button on the playback VCR a little before the recording VCR.

**When editing is completed**

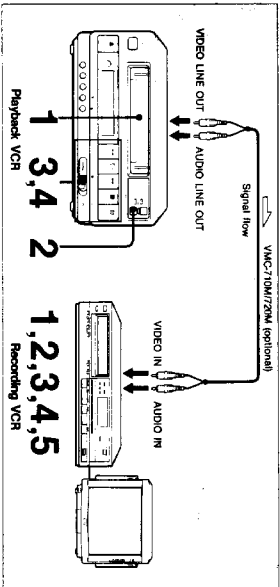
**6** Press the PAUSE/STILL button at the end point of the edit.

To edit the next scene  
Repeat steps 4 to 6.  
When editing is completed  
Press the STOP button on both of the units.

## Editing

## To Gather Desired Scenes from the Original Tape — Assemble Editing

**Example 5** — Using a VCR not equipped with a second transport  
Playing back with the EVCR and recording with another VCR



## Playback VCR

**1** Insert a cassette

Turn on the power of the unit and insert a source tape.

**2** Press the EDIT button and light the indicator.

Activate the EDIT mode if the unit has this function.

**3** Search for the playback start point and enter the playback pause mode.

Search for the edit start point and enter the recording pause mode.

**4** Release the playback and recording pause mode of both VCRs.

Press the PAUSE/STILL button on the playback VCR a little before the recording VCR.

## Playback start

Press the PAUSE button at the end point of the edit.

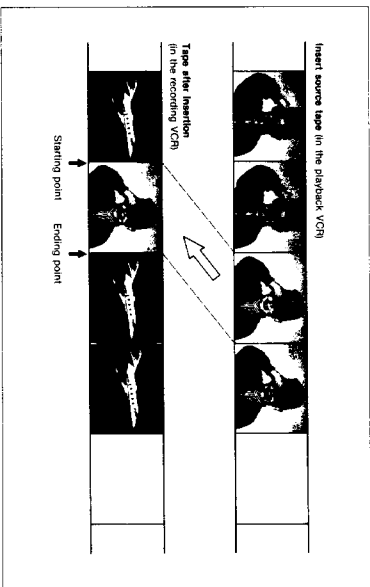
**5**

To edit the next scene  
Repeat steps 3 to 5.

When editing is completed  
Press the STOP button on both of the units.

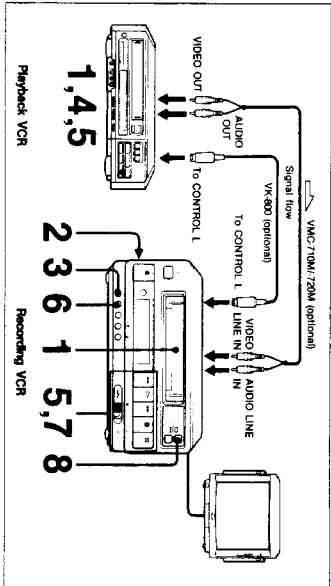
## To Re-record New Scenes onto the Original Tape — Insert Editing

**1** Insert editing is a technique to re-record (insert) a different scene onto the original tape.



Refer to the following pages for operation.

Example — Playing back with another VCR and recording with the EV-C3



#### Playback VCR

#### Recording VCR

**1** Turn on the power of the unit and insert a source tape.

Insert the original tape.

**2** Set the SLAVEMASTER switch to MASTER.

**3** Select the recording mode by the SFLP button. Select the mode in which the previous recording was made.

**4** Activate the EDIT mode if the unit has this function.

**5** Search for the playback start point and enter the playback pause mode.

Search for the edit end point.

**6** Press the COUNTER RESET button to display "00:00:00" in the display window.

**7** Rewind the tape and enter the recording pause mode at the start point of the edit.

**8** Press the SYNCHRO EDIT button. The indicator of the SYNCHRO EDIT and EDIT button lights.

**9** The unit automatically enters the playback pause mode when the editing is completed.

The unit automatically enters the recording pause mode when the TAPES COUNTER displays "00:00:00". To stop editing before the point set in step 6, press the SYNCHRO EDIT button.

To edit the next scene Repeat steps 5 to 9.

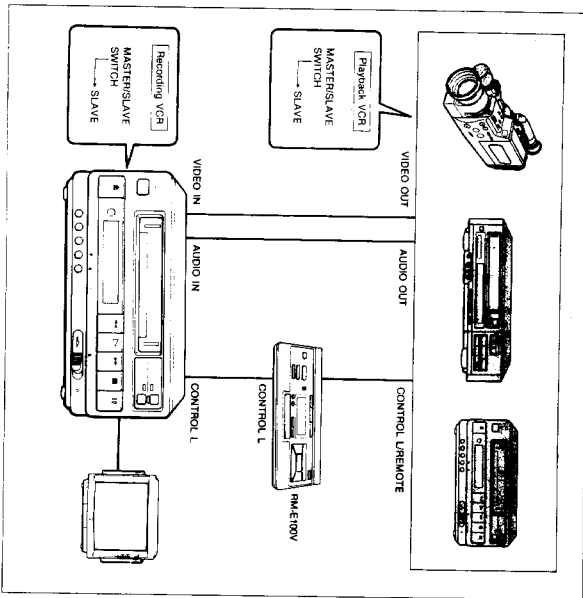
When editing is completed Press the STOP button on both of the units.



## Editing with the Video Editing Controller

## Example — Controlling the EV-C3 with the Sony RM-E100V Video Editing Controller

By connecting EV-C3 and another VCR to the Sony Video Editing Controller such as the RM-E100V, both of the VCRs can be used to assist in editing procedures. For your reference, the following example is given below. Please refer to the manual of the RM-E100V for detailed operation.



## Antenna Connection

In order to view the playback picture on the TV screen, the EV-C3 and the TV receiver must be connected properly. The connection between the two units varies depending upon the type of TV receiver and the antenna that you have.

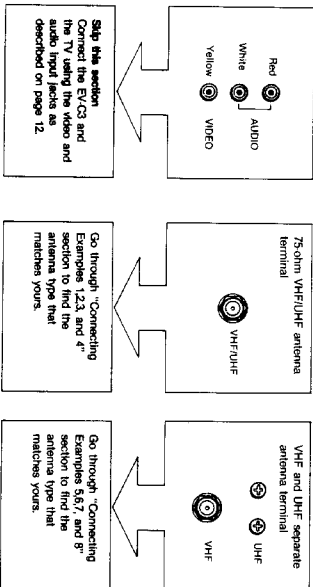
If your TV receiver does not have video and audio inputs, connect the EV-C3 to the TV receiver. It becomes very important. Before operating the unit, go through this section to make the correct connections.

## First Check Your TV

If your TV has video and audio input jacks

If your TV does not have video and audio input jacks

Check the antenna terminals on your TV.



## Before you begin...

- Turn off the power to the recorder and the TV.
- Disconnect the AC power cord of the recorder and the TV from the wall outlet.
- Do not connect the AC power cords until all of the connections are completed.

If your TV does not match the three examples given above  
Consult your nearest Sony dealer or a qualified technician.

## Caution

Connections between the recorder VHF/UHF OUT connector and the antenna terminals of a TV receiver should be made only as shown in the instructions. Failure to do so may result in operation that violates the regulation of the Federal Communications Commission regarding the use and operation of  $\Gamma$  devices. Never connect the output of the recorder to an antenna or make simultaneous parallel antenna connections at the antenna terminals of your receiver.

## Connecting Examples

## 1 To connect a combination VHF/UHF antenna

	<ol style="list-style-type: none"> <li>1 Most combination antennas are equipped with a UV band separator (signal splitter). Remove the separator from the antenna cable.</li> <li>2 Attach an F-type connector to the antenna cable (see page 38).</li> <li>3 Insert the F-type connector to the VHF/UHF IN on the recorder.</li> <li>4 Connect the VHF/UHF OUT on the recorder to the VHF/UHF antenna terminal on the TV using the supplied 75-ohm coaxial cable. * Use an optional PFC-8 extension cable, 8 m (26 ft) long, if the supplied 75-ohm coaxial cable is not long enough.</li> </ol>
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## 2 To connect the VHF antenna only

	<ol style="list-style-type: none"> <li>1 Connect the VHF antenna to the VHF/UHF IN on the recorder. * If the cable is a 75-ohm coaxial round type. — Attach the optional F-type connector to the cable. (See "Attaching an F-type Connector" on page 38). — Insert the F-type connector to the VHF/UHF IN on the recorder. * If the cable is a 300-ohm twin lead (flat) type. — Attach the supplied antenna connector to the cable. (See "Attaching an External Antenna Connector" on page 38). — Connect the antenna connector to the VHF/UHF IN on the recorder.</li> <li>2 Connect the VHF/UHF OUT on the recorder and the VHF/UHF antenna terminal on the TV using the supplied 75-ohm coaxial cable.</li> </ol>
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## 3 To connect the UHF antenna only

	<ol style="list-style-type: none"> <li>1 Attach the supplied antenna connector to the cable. (See "Attaching an External Antenna Connector" page 39).</li> <li>2 Attach the antenna connector to the VHF/UHF IN on the recorder.</li> <li>3 Connect the VHF/UHF OUT on the recorder and the VHF/UHF antenna terminal on the TV using the supplied 75-ohm coaxial cable.</li> </ol>
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## 4 To connect both the VHF and UHF antennas

	<ol style="list-style-type: none"> <li>1 Attach an optional UV band separator to the VHF/UHF IN connector on the recorder.</li> <li>2 Connect the VHF and UHF antennas to the UV band separator.</li> <li>3 Connect the UV band separator to the VHF/UHF IN connector on the recorder.</li> <li>4 Connect the VHF/UHF OUT connector on the recorder to the VHF/UHF antenna terminal on the TV using the supplied 75-ohm coaxial cable.</li> </ol>
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## 5 To connect a combination VHF/UHF antenna

	<ol style="list-style-type: none"> <li>Most combination antennas are equipped with a cable separator (see antenna). Remove the separator from the antenna cable.</li> <li>Attach an F-type connector to the cable. (See "Attaching an F-type connector" on page 38).</li> <li>Insert the F-type connector to the VHF/UHF IN on the recorder.</li> <li>Connect the 300-ohm twin lead (flat) type cable and the 75-ohm coaxial cable to the UHF band separator removed from the antenna in Step 1 to the VHF and UHF antenna terminal on the TV.</li> <li>Connect the UHF band separator and the VHF/UHF OUT on the recorder to the supplied 75-ohm coaxial cable.</li> </ol>
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## 7 To connect the UHF antenna only

	<ol style="list-style-type: none"> <li>Connect the 300-ohm twin lead (flat) type antenna cable to the VHF antenna terminal on the TV.</li> <li>Connect the VHF/UHF OUT on the recorder to the VHF IN terminal on the TV receiver.</li> </ol>
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## 6 To connect the VHF antenna only

	<ol style="list-style-type: none"> <li>Connect the VHF antenna to the VHF/UHF IN on the recorder.           <ul style="list-style-type: none"> <li>If the cable is a 75-ohm coaxial (round) type:               <ul style="list-style-type: none"> <li>Attach the optional F-type connector to the cable. (See "Attaching an F-type connector" on page 38).</li> <li>Insert the F-type connector to the VHF/UHF IN on the recorder. (flat) type.</li> </ul> </li> <li>If the cable is a 300-ohm twin lead (flat) type:               <ul style="list-style-type: none"> <li>Attach the supplied antenna connector to the cable. (See "Attaching an antenna connector" on page 38).</li> <li>Attach the antenna connector to the VHF/UHF IN on the recorder.</li> </ul> </li> </ul> </li> <li>Connect the VHF/UHF OUT on the recorder to the VHF/UHF antenna terminal on the TV using the supplied 75-ohm coaxial cable.</li> </ol>
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## 8 To connect both the VHF and UHF antennas

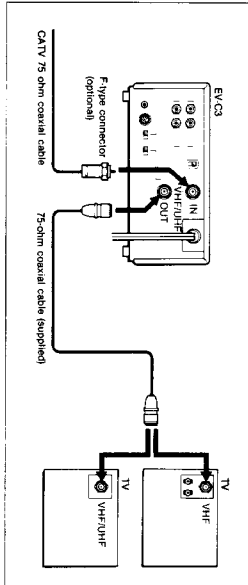
	<ol style="list-style-type: none"> <li>Attach the 300-ohm twin lead (flat) type antenna cable to the UHF antenna terminal on the TV receiver.</li> <li>Attach an optional F-type connector to the VHF antenna cable.</li> <li>Insert the F-type connector into the VHF/UHF IN on the recorder.</li> <li>Connect the VHF/UHF OUT in the recorder and the VHF antenna terminal on the TV using the supplied 75-ohm coaxial cable.</li> </ol>
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## Antenna Connection

### Connecting Examples

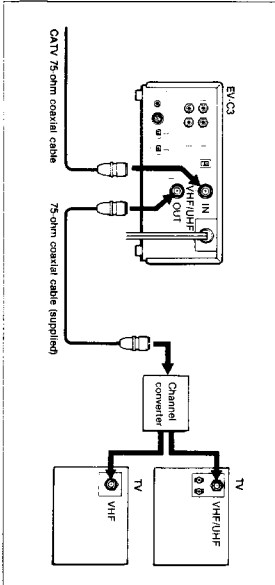
#### When the TV is a cable TV compatible type

An connecting example is given below. But, we recommend you to consult your cable company to make sure that the cable is properly connected.



#### When the TV is not a cable TV compatible type

Connect the cable TV channel converter between the TV and the cable TV. In this case, you can watch a cable TV program while playing back or recording video sources using the VIDEO LINE IN jack on the EV-C3.

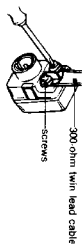


#### Attaching an external antenna connector

- 1 Loosen the screws on the antenna connector.

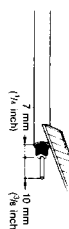
- 2 Fit the 300-ohm twin lead cable on the UHF connector under the screws on antenna.

- 3 Tighten the screws again.



#### Attaching an F-type connector

- 1 Strip 1/4 inch from the end of the cable so 3/8 inch of the center conductor is exposed.



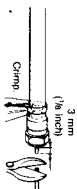
- 2 Slip the crimping ring over the cable.



- 3 Insert the inner conductor into the F-type connector shaft and push the end of the cable into the connector as far as it will go.



- 4 Slide the crimping ring over this assembly. Then pinch the crimping ring with pliers to hold the connection in place.

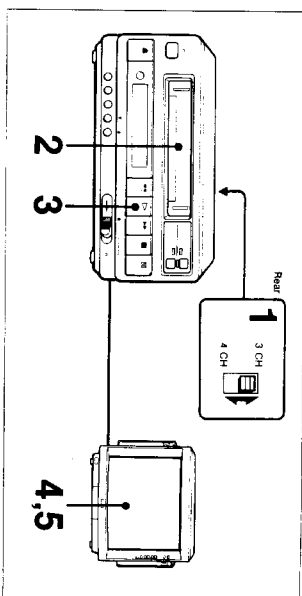


- 5 Insert the F-type connector into the VHF/UHF IN on the recorder.



## Setting the RF Unit

To get the proper RF signal, set the RF UNIT selector switch on the rear panel of the EV-C3. If channel 4 is active in your area, set the switch to channel 3, and vice versa.



**1** Set the RF UNIT located at the rear to 3 CH or 4 CH, whichever is not active in your area.

**2** Insert a recorded cassette.

**3** Press ► PLAY.

**4** Turn on the TV.

**5** Set the TV receiver to either VHF channel 3 or 4 to agree with the RF UNIT setting you made in step 1. The picture recorded on the tape will appear on the TV screen, or if the picture appears on the screen, or if the picture is not clear, tune the channel on the TV.

\* For details about the TV channel adjustment, see the instruction of the TV receiver.

## Specifications

### System

#### Video recording system

Relay two-head helical scanning  
FM color under system  
NTSC color, EIA standards

#### Audio signal

Relay head, FM system

#### Audio recording system

SP mode: Approx. 14.3 min/sec.

#### Unstable cassette

LP mode: Approx. 7.2 min/sec.

#### Tip speed

SP mode: 2 hours with the Sony

#### Recording/Playback time

LP mode: 4 hours with the Sony

#### Fast forward/reverse time

Approx. 4 min with the Sony

#### Inputs and Outputs

#### Video input

VIDEO IN: phono jack

#### Video output

VIDEO OUT: phono jack

#### Audio input

AUDIO IN: phono jack

#### Audio output

AUDIO OUT: phono jack

#### VHF/UHF input

F-type connector, 75 ohms,

#### VHF/UHF output

F-type connector, 75 ohms,

#### Control S IN

Mini type

#### Control L (Master/slave)

5 pin DIN

### General

#### Power requirements

AC 100 V  $\pm 10\%$ , 60 Hz

#### Power consumption

16 W

#### Operating temperature

5°C to 40°C (41°F to 104°F)

#### Storage temperature

-30°C to +40°C (-4°F to +104°F)

#### Dimension

Approx. 176  $\times$  88  $\times$  255 mm

#### Weight

Approx. 2.4 kg (5 lb, 5 oz)

### Remote Commander RMT-450

#### Remote control system

Infrared control

#### Command mode

VTR-2

#### Power requirements

AC 100 V DC, using two size AA (R6)

#### Dimensions

Approx. 40  $\times$  18  $\times$  175 mm

#### Weight

Approx. 105 g (3.7 oz)

### Accessories Supplied

Remote Commander RMT-450 (1)

Size AA (R6) battery (2)

Coaxial antenna connector (1)

75 ohm coaxial cable with F-type connector, 2 m (1)

Design and specifications are subject to change without notice.

## Troubleshooting

Symptom	Possible Causes
POWER cannot be turned on.	Power cord is not connected.
Cannot monitor playback picture on the screen.	The TV/VTR switch is set to TV.
Poor picture quality.	<ul style="list-style-type: none"> <li>The video heads are dirty. Clean the heads using the Sony V6 25CL video head cleaning cassette. For details on cleaning, refer to the instructions furnished with the cassette.</li> <li>The video heads of the cassette deck or the cassette is not available in your area, have the heads cleaned at the nearest Sony service facility.</li> </ul>
Playback cannot be performed even when the ► PLAY button is pressed.	The tape is at its end.
No recording can be performed.	The tab on the cassette is slid out with the red portion showing.
Search using the TAFE RETURN button cannot be performed.	The TAFE RETURN button was pressed before the tape counter display was more than one minute.
Cannot control by the Remote Commander.	The batteries are exhausted.